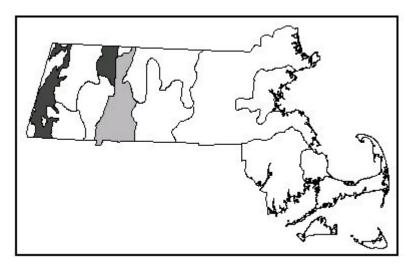
Community Name: Community ELCODE: SRANK:

BLACK ASH-RED MAPLE-TAMARACK CALCAREOUS SEEPAGE SWAMP

CP1B2B0000

S2



Concept:

Mixed deciduous-coniferous forested swamps occurring in areas where there is calcareous groundwater seepage. The species-rich herbaceous layer is characterized by calcium-loving species. Calcareous seepage swamps can also be called forested fens.

Environmental setting:

The occurrence of calcareous or circumneutral groundwater seepage defines this community. The more calcareous the seepage, the more rare plant species are likely to be found. Soils are mineral but with a thin layer of peat accumulation at the surface. More information is needed on the physical characteristics of this community.

Vegetation Description:

A variable mixture of deciduous and coniferous trees forms the canopy, but black ash (*Fraxinus nigra*), tamarack (Larix laricina), and red maple (Acer rubrum) are most common. Other associated tree species at low elevations, less than 1,000 ft., are bur oak (Quercus macrocarpa), yellow birch (Betula alleghaniensis), American elm (Ulmus americana), white pine (Pinus strobus), and hemlock (Tsuga canadensis). At higher elevations, red spruce (Picea rubens), balsam fir (Abies balsamea), and Canada yew (Taxus canadensis) can also occur. Ironwood (Carpinus caroliniana) is characteristic of the subcanopy. The shrub layer can be dense, and characteristic species are poison sumac (Toxicodendron vernix) and alder-leaf buckthorn (Rhamnus alnifolia), mixed with speckled alder (Alnus rugosa), gray dogwood (Cornus racemosa), winterberry (Ilex verticillata), spicebush (Lindera benzoin), meadowsweet (Spiraea latifolia), and highbush blueberry (Vaccinium corymbosum). Shrubby cinquefoil (Pentaphylloides floribunda) often occurs in open areas. The herbaceous layer is diverse with many calciphilic (calcium-loving) species mixed in with other common wetland plants. Characteristic calciphiles (calcium-loving) are delicate sedge (Carex leptalea), brome-like sedge (Carex bromoides), long-stalked sedge (Carex pedunculata), rough-leaved goldenrod (Solidago patula), and golden ragwort (Senecio aureus). Other typical species in the herbaceous layer are skunk cabbage (Symplocarpus foetidus), sensitive fern (Onoclea sensibilis), royal fern (Osmunda regalis), jewelweed (Impatiens capensis), and naked mitrewort (Mitella nuda). This community type also has a concentration of state-protected rare plant species.

Associations:

No associations have been described in Massachusetts.

Habitat values for Associated Fauna:

Calcareous seepage swamps c can function as vernal pool habitat if water remains standing for 2-3 months and they lack fish; these areas provide important amphibian breeding habitat.

Associated rare plants:

| CAREX SCHWEINITZII | SCHWEINITZ'S SEDGE | E |
|--------------------------------|----------------------|----|
| CONIOSELINUM CHINENSE | HEMLOCK PARSLEY | SC |
| CYPRIPEDIUM REGINAE | SHOWY LADY'S-SLIPPER | SC |
| MALAXIS BRACHYPODA | WHITE ADDER'S-MOUTH | T |
| PYROLA ASARIFOLIA VAR PURPUREA | PINK PYROLA | E |

From: Swain, P.C. & J.B. Kearsley. 2001. Classification of the Natural Communities of Massachusetts. Version 1.3. Natural Heritage & Endangered Species Program, Division of Fisheries & Wildlife. Westborough, MA.

Natural Heritage & Endangered Species Program, Massachusetts Division of Fisheries & Wildlife

QUERCUS MACROCARPA MOSSY-CUP OAK SC RIBES TRISTE SWAMP RED CURRANT - WL Associated rare animals: AMBYSTOMA JEFFERSONIANUM JEFFERSON SALAMANDER SC **CLEMMYS GUTTATA** SPOTTED TURTLE SC CLEMMYS INSCULPTA WOOD TURTLE SC CLEMMYS MUHLENBERGII **BOG TURTLE** Ε

Examples with Agawam Lake WMA, Great Barrington/Stockbridge.

Public Access:

HEMIDACTYLIUM SCUTATUM

WILLIAMSONIA FLETCHERI

Threats: Logging, nutrient inputs such as road salts, damming by beavers, and alterations of water levels

threaten this community. Water level disturbance can lead to the invasion by non-native plants, including the aggressive exotics purple loosestrife (*Lythrum salicaria*), Tatarian honeysuckle (*Lonicera tatarica*), and Morrow's honeysuckle (*Lonicera morrowii*). Phragmites (*Phragmites australis*) is also

SC

E

an aggressive exotic in disturbed forested fens.

Management needs: Removal/control of non-native plant species, especially phragmites.

Synonyms

USNVC/TNC: Fraxinus nigra-Acer rubrum-(Larix laricina)/Rhamnus alnifolia forest [CEGL006009]; Fraxinus nigra-

Acer rubrum/Nemopanthus mucronatus-Vaccinium corymbosum forest [CEGL006220].

FOUR-TOED SALAMANDER

EBONY BOGHAUNTER

MA [old name]: SNE Calcareous Seepage Swamp [CP3B1A0000].

ME: Not described.

VT: Tamarack-red maple forested fen.

NH: Calcareous/circumneutral hardwood seepage swamp; Hardwood-conifer seepage swamp.

NY: Rich hemlock-hardwood peat swamp: Red maple-tamarack peat swamp.

CT: Similar to Acer rubrum-Fraxinus nigra/Ranunculus hispidus var. caricetorum community; Acer

rubrum/Lindera benzoin community.

RI: Not described.

Golet & Larson, 1974: Deciduous wooded swamp (WS-1); Evergreen wooded swamp (WS-2).

Other: Forested fen community [Weatherbee 1996]; Rich forested swamp [Motzkin 1995]

Author: J. Kearsley Date: 7/21/99